

CLAIMSWhat Is Claimed Is:

1. A method for defibrillating a heart, comprising:
5 placing a first electrode into electrical contact with a first portion of the heart;
placing a second electrode into electrical contact with a second portion of the heart; and
transmitting an electrical pulse between the first electrode and the second electrode in response to a determination that a cardiac event is detected.

10 2. A method, according to claim 1, wherein placing the first electrode into electrical contact with the first portion of the heart further comprises placing the first electrode into electrical contact with a wall of a right atrium of the heart.

15 3. A method, according to claim 1, wherein placing the second electrode into electrical contact with the second portion of the heart further comprises placing the second electrode into electrical contact with a wall of an oblique vein.

20 4. A method, according to claim 1, wherein transmitting the electrical pulse further comprising transmitting the electrical pulse between the first electrode and the second electrode in response to a determination that atrial fibrillation is detected.

25 5. A method, according to claim 1, wherein transmitting the electrical pulse further comprises transmitting a uniphasic electrical pulse between the first electrode and the second electrode.

30 6. A method, according to claim 1, wherein transmitting the electrical pulse further comprises transmitting a biphasic electrical pulse between the first electrode and the second electrode.

7. A method, according to claim 1, further comprising:
placing a third electrode into electrical contact with a wall of a right ventricle
of the heart; and
transmitting an electrical pulse between the third electrode and at least one of
the first and second electrodes if the heart is experiencing ventricular fibrillation.

8. A method, according to claim 3, further comprising sensing the heart
for ventricular fibrillation.

9. A method, according to claim 3, wherein transmitting the electrical
pulse further comprises transmitting a uniphasic electrical pulse between the third
electrode and at least one of the first and second electrodes.

10. A method, according to claim 3, wherein transmitting the electrical
pulse further comprises transmitting a biphasic electrical pulse between the third
electrode and at least one of the first and second electrodes.

11. An apparatus for defibrillating a heart, comprising:
means for placing a first electrode into electrical contact with a first portion of
the heart;
means for placing a second electrode into electrical contact with a second
portion of the heart; and
means for transmitting an electrical pulse between the first electrode and the
second electrode in response to a determination that a cardiac event is detected.

12. An apparatus, according to claim 11, wherein the means for placing the
first electrode into electrical contact with the first portion of the heart further
comprises means for placing the first electrode into electrical contact with a wall of a
right atrium of the heart.

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13. An apparatus, according to claim 11, wherein the means for placing the second electrode into electrical contact with the second portion of the heart further comprises means for placing the second electrode into electrical contact with a wall of an oblique vein.

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14. An apparatus, according to claim 11, wherein means for transmitting the electrical pulse further comprises means for transmitting the electrical pulse between the first electrode and the second electrode in response to a determination that atrial fibrillation is detected.

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15. An apparatus, according to claim 11, wherein the means for transmitting the electrical pulse further comprises means for transmitting a uniphasic electrical pulse between the first electrode and the second electrode.

16. An apparatus, according to claim 11, wherein the means for transmitting the electrical pulse further comprises means for transmitting a biphasic electrical pulse between the first electrode and the second electrode.

20. 17. An apparatus, according to claim 11, further comprising:
means for placing a third electrode into electrical contact with a wall of a right ventricle of the heart; and
means for transmitting an electrical pulse between the third electrode and at least one of the first and second electrodes if the heart is experiencing ventricular fibrillation.

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18. An apparatus, according to claim 17, further comprising means for sensing the heart for ventricular fibrillation.

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19. An apparatus, according to claim 17, wherein the means for transmitting the electrical pulse further comprises means for transmitting a uniphasic electrical pulse between the third electrode and at least one of the first and second electrodes.

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20. An apparatus, according to claim 17, wherein the means for transmitting the electrical pulse further comprises means for transmitting a biphasic electrical pulse between the third electrode and at least one of the first and second electrodes.

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21. A medical device, comprising:

a control unit capable of outputting a defibrillating pulse;

10 a first lead having a proximal end portion coupled with the control unit and a first electrode electrically coupled with the control unit and disposed distally from the proximal end portion of the first lead, wherein the first lead is capable of being routed through a venous system of a body such that the first electrode is electrically coupled with a wall of a right atrium of a heart;

15 a second lead having a proximal end portion coupled with the control unit and a second electrode electrically coupled with the control unit and disposed distally from the proximal end portion of the second lead, wherein the second lead is capable of being routed through the venous system of the body such that the second electrode is electrically coupled with a wall of an oblique vein.

20. A medical device, according to claim 21, wherein:

20 the first lead is capable of receiving the defibrillating pulse from the control unit and is capable of transmitting the defibrillating pulse to the heart via the first electrode; and

25 the second lead is capable of transmitting the defibrillating pulse, received by the second electrode from the heart, to the control unit.

23. A medical device, according to claim 21, wherein:

23 the second lead is capable of receiving the defibrillating pulse from the control unit and is capable of transmitting the defibrillating pulse to the heart via the second electrode; and

30 the first lead is capable of transmitting the defibrillating pulse, received by the first electrode from the heart, to the control unit.

24. A medical device, according to claim 21, wherein:

the control unit is capable of outputting a biphasic defibrillation pulse having a first phase and a second phase, wherein the first phase is outputted to the first lead and the second phase is outputted to the second phase;

5 the first lead is capable of receiving the first phase from the control unit and is capable of transmitting the first phase to the first electrode;

the second lead is capable of receiving the second phase from the control unit and is capable of transmitting the second phase to the second electrode;

10 the first lead is capable of transmitting the second phase, received by the first electrode from the heart, to the control unit; and

the second lead is capable of transmitting the first phase, received by the second electrode from the heart, to the control unit.

25. A medical device, according to claim 21, wherein:

15 at least one of the first lead and the second lead further comprises a sensing electrode electrically coupled with the control unit and being capable of receiving an electrical stimulus corresponding to a heart rhythm; and

the control unit is capable of receiving and processing the electrical stimulus.

20 26. A medical device, according to claim 21, wherein the first lead further comprises a third electrode electrically coupled with the control unit and disposed intermediate the proximal end portion of the first lead and the first electrode, wherein the first lead is capable of being routed through the venous system of the body such that the third electrode is electrically coupled with a wall of a right ventricle of the heart.

25 27. A medical device, according to claim 26, wherein:

30 the first lead is capable of receiving the defibrillation current from the control unit and is capable of transmitting the defibrillation current to the heart via the third electrode; and

the first lead is capable of transmitting the defibrillation current, received via the first electrode from the heart, to the control unit.

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28. A medical device, according to claim 26, wherein:

the first lead is capable of receiving the defibrillation current from the control unit and is capable of transmitting the defibrillation current to the heart via the third electrode; and

5 the second lead is capable of transmitting the defibrillation current, received via the second electrode from the heart, to the control unit.

29. A medical device, according to claim 26, wherein:

10 the first lead is capable of receiving the defibrillation current from the control unit and is capable of transmitting the defibrillation current to the heart via the third electrode;

15 the second lead is capable of transmitting a first portion of the defibrillation current, received via the second electrode from the heart, to the control unit; and

the first lead is capable of transmitting a second portion of the defibrillation current, received via the first electrode from the heart, to the control unit.

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